

**Notice of Allowability**

Application No.

09/876,319

Examiner

Wes Tucker

Applicant(s)

ADACHI ET AL.

Art Unit

2623

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--**

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to RCE filed October 5<sup>th</sup> 2005.
2. ☒ The allowed claim(s) is/are 72-115.
3. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some\* c) ☐ None of the:
- ☒ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.  
**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
- (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
- 1) ☐ hereto or 2) ☐ to Paper No./Mail Date \_\_\_\_\_.
- (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

**Attachment(s)**

- |   |   |
|---|---|
| 1. <input type="checkbox"/> Notice of References Cited (PTO-892)  | 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)           |
| 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                | 6. <input type="checkbox"/> Interview Summary (PTO-413),<br>Paper No./Mail Date _____ |
| 3. <input type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),<br>Paper No./Mail Date _____ | 7. <input type="checkbox"/> Examiner's Amendment/Comment                              |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit<br>of Biological Material          | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance  |
|   | 9. <input type="checkbox"/> Other _____   |

JINGGEWU  
PRIMARY EXAMINER

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on October 5<sup>th</sup>, 2005 has been entered.

### ***Response to Amendment***

2. The amendment filed in the after-final response on September 19, 2005 has now been entered in accordance with the request for continued examination.

3. Applicant has canceled claims 1-71. New claims 72-115 have been added. Claims 72-115 are currently pending.

4. Applicants remarks in conjunction with the newly presented are considered to be persuasive and claims 72-115 have been deemed allowable.

### ***Allowable Subject Matter***

5. Claims 72-115 are allowed.

The following is an examiner's statement of reasons for allowance:

Applicant has presented new independent claims 72, 97, 99, 110 and 112 containing the basic limitations of determining collation between images including collation means for determining coincidence ratios. The present application determines both minimum and maximum coincidence values for collating images.

Typical image collation methods need only determine a maximum coincidence ration to compare to a threshold in order to determine if there is indeed collation between images.

The present application teaches that a minimum coincidence ratio may be used to indicate matching images. This specific teaching appears to be specifically applicable to fingerprint images in which a precise minimum collation indicates a match just slightly off center due to the parallel ridge nature of fingerprints. It is difficult to envision another environment where this type of image coincidence ratio would indicate a match.

U.S. Patent 4,641,350 to Bunn teaches the matching of fingerprints in the typical fashion of finding the maximum correspondence or coincidence ratio and comparing to a threshold to determine a match, but does not teach using a minimum coincidence ratio.

U.S. Patent to 4,983,036 to Froelich teaches that a minimum peak in correspondence or coincidence ratio may be used to indicate a match in the environment of fingerprint imaging. However neither Bunn nor Froelich nor any of the found prior art teach or fairly suggest that both minimum coincidence ratio and a maximum coincidence ratio are to be found and the difference between the two ratios

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be calculated in order to compare the calculated value to a threshold in order to indicate a match.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

### ***Conclusion***

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Wes Tucker whose telephone number is 571-272-7427. The examiner can normally be reached on 9AM-5PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jingge Wu can be reached on 571-272-7429. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Wes Tucker

11-4-05

JINGGE WU  
PRIMARY EXAMINER

A large, stylized handwritten signature in black ink, likely belonging to Jingge Wu, is written over the printed name and title. The signature is fluid and cursive, with a long horizontal stroke extending to the right.